

ABSTRACT

PT Mizan Grafika Sarana is a printing books company. This research focuses on soft cover books printing. Based on the data obtained from the company, there were delays on the soft book delivery in almost every month in 2017. This problem is solved by using lean manufacturing approach, identification of production process through mapping of current stream value stream mapping (VSM) and process activity mapping (PAM). Through the identification, the result of identification of waste waiting is 9%. Therefore, it is necessary to make improvement plan to minimize waste waiting. Furthermore, to identify the root cause of waste waiting, it is necessary to identify the root cause of waste waiting using fishbone diagram and 5 why's. The problem solving stage for the root causes of waste waiting uses one of the manufacturing tools, SMED.

The proposed improvement plan to minimize waste waiting on the printing workstation is adding operators for the activity of changeover plate, scheduling of replacement of smash blanket spare part at specified time interval, giving checksheet maintenance and proposing poster of visual control. Based on the proposed improvement plan, the future value stream mapping (VSM) state is mapped, as the lead time is reduced to 10924,115 seconds (3,03 hours).

Keywords: Soft Cover Book, Lean Manufacturing, Waste Waiting, Fishbone Diagram, 5 Why's, Value Stream Mapping, Process Activity Mapping, SMED